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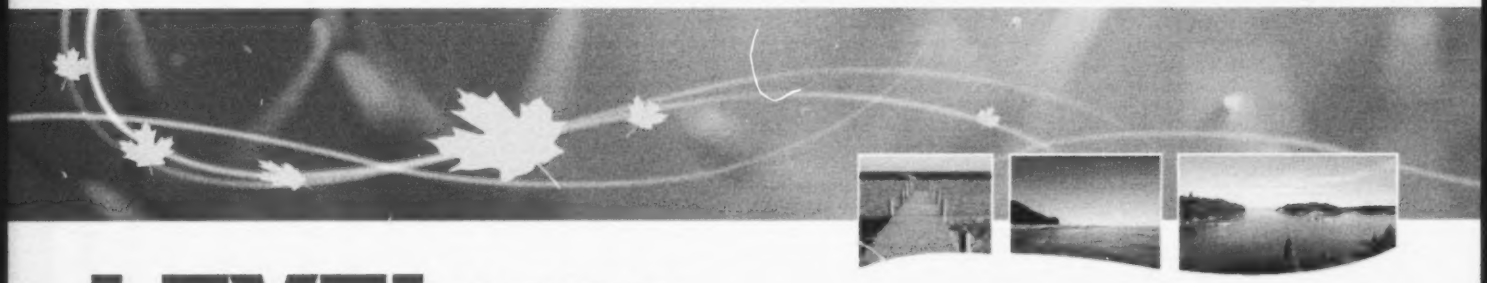

LEVELnews

Great Lakes — St. Lawrence River Water Levels

Lake Superior dry, rest of Great Lakes wetter in April

Lake Superior water supplies were dry for the second month in a row, while the rest of the Great Lakes had wetter conditions. This resulted in Lake Superior's levels falling away from the near record levels seen in previous months when its mean-monthly and beginning-of-month levels for January through March 2018 were within 7 cm of record high values. The rest of Great Lakes received near to above average water supplies in April resulting in Lake Erie's and Superior's levels remaining as high as they have been since 1998. All the lakes levels stayed above average, however Lake Superior and Lake Ontario both had beginning-of-May levels below those seen a year ago at the same time. The levels of the St. Lawrence River at Montreal Harbour were below average in early April but rose to above average by the month's end due to snowmelt and rainfall.

New LEVELnews web site

The Government of Canada has updated the LEVELnews web site and now current and past editions can be found on the LEVELnews: monitoring Great Lakes and St. Lawrence River water levels web site at: https://www.canada.ca/en/environment-climate-change/services/water-overview/quantity/great-lakes-levels-related-data/levelnews-great-lakes-st-lawrence.html.

Great Lakes Water Level Information

Lake	April 2018 Monthly Mean Level		Beginning-of-May 2018 Level	
	Compared to Monthly Average (1918–2017)	Compared to One Year Ago	Compared to Beginning-of-Month Average (1918–2017)	Compared to One Year Ago
Superior	21 cm above	6 cm above	15 cm above	4 cm below
Michigan–Huron	41 cm above	13 cm above	41 cm above	10 cm above
St. Clair	56 cm above	13 cm above	54 cm above	10 cm above
Erie	55 cm above	14 cm above	55 cm above	12 cm above
Ontario	13 cm above	34 cm below	19 cm above	36 cm below

Canada

April monthly lake levels

All the Great Lakes had monthly-mean levels above average with Lake Ontario being the closest to average and Lake Erie being well above average. Lake Superior was 21 cm above its period-of-record (1918–2017) April monthly mean water level and 6 cm higher than April 2017 but 21 cm below the record high value set in 1986. Lake Michigan–Huron's mean level in April was 41 cm above average, 13 cm higher than last April's level and the highest since 1998. Lake Erie's mean monthly level was 55 cm above average, 14 cm above the level of the previous April and the highest it has been since 1998. Lake Ontario's April monthly mean level was 13 cm above average and 34 cm lower than the level last year.

Lake level changes

Dry conditions through April on Lake Superior resulted in it being the only lake to fall through the month of April. The other lakes all rose by amounts near to or above average for this time of year. Below average water supplies and higher than average outflow for the second month in a row resulted in Lake Superior falling 3 cm through April, a record-high fall for the month, when on average (1918–2017) it rises 8 cm. Lake Michigan–Huron rose 10 cm over April, nearly its average rise of 11 cm. Lake Erie levels rose 13 cm over April, slightly higher than its average rise of 12 cm. Lake Ontario rose 27 cm over April, when on average it rises 20 cm mainly as a result of well above-average inflows and despite above average outflows.

Beginning-of-May lake levels

Lakes Michigan–Huron and Erie both had beginning-of-May levels higher than those last year at the same time, while Lakes Superior and Ontario both had levels lower than last May. Lake Superior's beginning-of-May level was 15 cm above average (1918–2017), but 4 cm below the level at this time last year and 28 cm lower than the record high set in 1986. Lake Michigan–Huron's beginning-of-May level was 41 cm above average, 10 cm higher than last year and the highest it has been at this time of year since 1998. Lake Erie was 55 cm above average at the beginning of May and 12 cm higher than its level this time last year. Lake Erie was the highest it has been since 1998 and only 14 cm below the record high set in 1985. Lake Ontario's level at the start of May was only 19 cm above average and 36 cm lower than the very high value seen last year at this time. At the beginning of May, all of the lakes were at least 26 cm above their chart datum level.

Period of record updated

Each year the data set used to calculate the monthly and beginning-of-month average water levels for each of the lakes is updated to include the data collected during the previous year. The lake level data for 2017 has now been verified and the period-of-record statistics used for comparison purposes has been updated to include data from 1918 to 2017.

April Precipitation over the Great Lakes[1,2]

Great Lakes Basin	**95%**	**Lake Erie (including Lake St. Clair)**	**106%**
Lake Superior	**44%**		
Lake Michigan–Huron	**103%**	**Lake Ontario**	**135%**

April Outflows from the Great Lakes[2]

Lake Superior	**119%**	**Lake Erie**	**125%**
Lake Michigan–Huron	**117%**	**Lake Ontario**	**121%**

[1]US Army Corps of Engineers
[2]As a percentage of the long-term April average.
NOTE: These figures are preliminary.

Water levels forecast

Looking ahead to summer water levels, it is likely that levels in all of the Great Lakes, except Lake Ontario, will continue to be well above average based on their beginning-of-May levels and past conditions on the lakes (1918–2017). If conditions are dry for Lake Ontario it could fall below average levels as soon as early summer. Even if very wet conditions are encountered, it is still unlikely that any of the lakes will hit their record high levels. Relative to their beginning-of-May levels and assuming average water supply conditions, all the Great Lakes are expected to rise or stay stable through May. Everyone around the Great Lakes should be prepared for higher water levels in June and July due to the lakes seasonal level rises, as average water supplies are greater than those through the winter months. For a graphical representation of recent and forecasted water levels on the Great Lakes, refer to the Canadian Hydrographic Service's monthly water levels bulletin at: http://tides-marees.qc.ca/C&A/bulletin-eng.html.

FOR MORE INFORMATION:

Derrick Beach (Editor)
Boundary Water Issues
National Hydrological Services
Meteorological Service Canada
Environment and Climate Change Canada
Burlington ON L7S 1A1
Tel.: 905-336-4714
Email:
ec.levelnews-infoniveau.ec@canada.ca

Rob Caldwell
Great Lakes–St. Lawrence Regulation Office
Meteorological Service Canada
Environment and Climate Change Canada
111 Water Street East
Cornwall ON K6H 6S2
Tel.: 613-938-5864

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